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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/077,767	02/20/2002	Shinya Soeda	401572	3441

23548 7590 10/29/2003

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EXAMINER

PRENTY, MARK V

ART UNIT	PAPER NUMBER
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2822

DATE MAILED: 10/29/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/077,767

Applicant(s)

SOEDA, SHINYA

Examiner

MARK V PRENTY

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 07 October 2003.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-15 and 17-20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 10-15, 17 and 18 is/are allowed.
- 6) ☒ Claim(s) 1-6 is/are rejected.
- 7) ☒ Claim(s) 7-9, 19 and 20 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_

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This Office Action is in response to the RCE filed October 7, 2003.

Claims 1-4 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Independent claim 1 is unclear in reciting: "a metal interconnection layer opposite said resistor grouping said logic region" (such should apparently read: "a metal interconnection layer opposite said resistor group in said logic region").

Claims 2-4 depend on independent claim 1 and are thus similarly unclear.

Claims 5 and 6 are rejected under 35 U.S.C. §102 as being anticipated by Prior Art Figs. 6A/14.

With respect to independent claim 5, Prior Art Figs. 6A/14 illustrate a semiconductor device comprising: a semiconductor substrate having at least one DRAM region and one logic region; a signal interconnection layer 108a in said logic region; a metal interconnection layer 129 in said logic region; and a first layer 126a including a metal, located between said signal interconnection layer and said metal interconnection as a first shielding layer in said logic region.

Claim 5 is thus rejected under 35 U.S.C. §102 as being anticipated by Prior Art Figs. 6A/14.

With respect to dependent claim 6, Prior Art Figs. 6A/14's signal interconnection layer 108a is common to a gate electrode layer in said DRAM region.

Claim 6 is thus rejected under 35 U.S.C. §102 as being anticipated by Prior Art Figs. 6A/14.

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Claim 7 is objected to as being dependent on a rejected base claim (i.e., claim 7 would be allowable over the prior art of record if claim 7 were amended to further include all the limitations of independent claim 5).

Claim 8 is objected to as being dependent on a rejected base claim (i.e., claim 8 would be allowable over the prior art of record if claim 8 were amended to further include all the limitations of independent claim 5).

Claim 9 is objected to as being dependent on a rejected base claim (i.e., claim 9 would be allowable over the prior art of record if claim 9 were amended to further include all the limitations of independent claim 5).

Claim 19 is objected to as being dependent on a rejected base claim (i.e., claim 19 would be allowable over the prior art of record if claim 19 were amended to further include all the limitations of independent claim 5).

Claim 20 is objected to as being dependent on a rejected base claim (i.e., claim 20 would be allowable over the prior art of record if claim 20 were amended to further include all the limitations of independent claim 5 and dependent claim 19).

Claims 10-15, 17 and 18 are allowable over the prior art of record.

The prior art of record does not disclose or suggest the allowable semiconductor devices taken as a whole, including the shielding layer.

The applicant's arguments are moot in view of the new ground of rejection.

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Registered practitioners can telephone examiner Prenty at (703) 308-4939. Any voicemail message left for the examiner must include the name and registration number of the registered practitioner calling, and the Application/Control (Serial) Number. Technology Center 2800's general telephone number is (703) 308-0956.

*Mark Prenty*  
Mark V. Prenty  
Primary Examiner